

Combining the absorbent gelling materials of Wang with the microfibers of Early merely teaches that these components can be used in the same absorbent structure. There is no contemplation that microfibers bind absorbent gelling materials, as in the amended claims. Additionally, there is nothing in the cited references which would lead on of skill in the art to make the combination suggested by the Examiner.

The problem solved by the instant invention is how to maximize the absorbent capacity of the hydrogel forming polymer by reducing gel blocking. Applicant's answer to the problem is to attach the individual absorbent gelling particles to a carrier layer by means of a glue binder fiber. This provides a structure wherein the bound particles are in a spaced apart configuration. The claims, as amended, require from 1% to 10% of the glue binder fiber. In addition, the claims, as amended, clearly require that the absorbent gelling particles are bound to the surface of the carrier layer by the glue microfibers which are chosen from specific polymer groups. On the other hand, the fibrous absorbent web of Early requires at least 50% of the absorbent web to comprise hydrophilic microfibers. These microfibers do not bind absorbent gelling particles to a carrier layer, in fact, they, in combination with the other components, comprise the web itself. The difference in level of microfiber content is due to the different uses—the microfibers of Early provide capillaries which, in the cited webs possess acceptable wicking rates, while the instant microfibers adhere the absorbent gelling material to the carrier layer.

The Examiner asserts that Wang teaches the adherence of absorbent gelling particles to the substrate web. Wang at column 16, line 43 (as cited by the Examiner) states: "Preferably, the absorbent core further comprises a substrate web wherein the absorbent material is attached to the substrate web." However, there is no contemplation of how attachment might take place and the addition of either or both of the Early and Anjur references fails to overcome this deficiency.

Additionally, the Examiner asserts regarding the "tackiness" of the instant glue microfibers "this property would be inherent in the fibers of Wang in view of Early, because binder fibers must have some tackiness in order to function as binder fibers." Applicant asserts that many binder fibers are not tacky, but perform the binding function via physical entanglement. Therefore, the fibers of Early are not required to be (and in fact are not contemplated to be) tacky. The fibers utilized by Early might be tacky during a melt process but there is no tendency that they remain tacky in the finished article. Finally, the claimed fibers, as amended, are comprised of materials whose formulation is not contemplated by the cited references.

As noted by the names of the microfilm polymers currently claimed (i.e., tackifier modified polymers and pressure sensitive adhesives) the instant microfibers are glues. Early's microfibers, however, are used to produce a web and such use would teach away from the instantly claimed microfiber types.

OTHER

For the foregoing reasons, Applicants respectfully submit that the Claims, as amended, and Claims depending therefrom, are allowable over the prior art relied upon by the Examiner. Accordingly, favorable reconsideration of Claims 1-19 and 39-41 is earnestly solicited in the form of a Notice of Allowance.

The Examiner has pointed out that the application does not contain an abstract of the disclosure on a separate sheet as required by 37 CFR 1.72(b). Applicant asserts that under Patent Cooperation Treaty practice, provision of the abstract on a separate page should not be required. However, in order to facilitate prosecution of the application, an abstract on a separate sheet is attached to this response. Support for the language of the abstract can be found on page 1 of the priority application published under the Patent Cooperation Treaty.

Attached hereto is a marked-up version of the changes made to the specification and claims by the current amendment. The attached page is captioned "Version with markings to show changes made." A separate page contains the abstract.

Should any issues regarding this Application remain unresolved, the Examiner is encouraged to contact the undersigned by telephone at the earliest possible date to achieve a timely resolution.

CONCLUSION

Based on the above amendments and remarks, Applicant respectfully requests that the Examiner withdraw his claim rejections under 35 U.S.C. 103.

Respectfully submitted,

FOR: E. REZAI ET AL.

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VERSION WITH MARKINGS TO SHOW CHANGES MADE

2. An absorbent material comprising:
- (a) absorbent gelling particles comprising a water-insoluble absorbent hydrogel forming polymer;
 - (b) a polycationic polymer;
 - (c) from about 1 % to about 10% of glue microfibers selected from the group consisting of:
 - i) tackifier modified polymers.
 - ii) pressure sensitive adhesives, and
 - iii) mixtures thereof;
 - (d) a carrier layer;
- wherein the polycationic polymer is bonded to the absorbent gelling particles; and [the glue microfibers act as an adhesive between the absorbent gelling particles and the carrier layer] wherein the absorbent gelling particles, deposited onto the carrier layer, are fixed to the surface of the carrier layer by the glue microfibers .
17. The absorbent material of claim 1, wherein the absorbent material comprises from about 50% to about 90% of the absorbent gelling particle, from about 0.1% to about 10% of the polycationic polymer; [from about 1% to about 10% of the thermoplastic polymeric microfiber] and from about 5% to about 50% of the carrier layer by weight.